

REMARKS

Claims 6-13 and 24-35 are pending in this application, of which claims 6-9, 11-13, and 24 have been amended. In response to the official action:

Claims were objected to for informalities. Correction is made, and withdrawal of the objection is requested. In claims 11-13 "blight" is changed to "dark" instead of to "bright" as in claims 9-12.

All claims were rejected for obviousness-type double patenting. This rejection is respectfully traversed. The PTO restricted the present claims from the parent application that is now the basis of the rejection (U.S. Patent 5,601,957), implying that a different invention is involved; but the present rejection is based on asserted similarity of invention, which is contrary.

Regarding claim 25, the Examiner states that the alignment marks are the same. However, the alignment marks of claim 25 are distinct from those of claims 1-10.

In view of the aforementioned amendments and accompanying remarks, the claims are believed to be in condition for allowance. Withdrawal of the rejection and allowance of all claims is requested.

Attached hereto is a marked-up version of the changes made by the current amendment. The attached page is captioned, "VERSION WITH MARKINGS TO SHOW CHANGES MADE".

In the event this paper is not timely filed, then this paper is a petition for an appropriate extension of time. The fees for such an extension or any other fees which may be due with respect to this paper may be charged to Deposit Account No. 01-2340.

Favorable consideration and allowance are respectfully solicited.

Respectfully submitted,

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Enclosure: Version With Markings to Show Changes

VERSION WITH MARKINGS TO SHOW CHANGES

IN THE CLAIMS

6. (Amended) A mask formed with an original pattern of alignment mark together with a pattern to be transferred, wherein the original pattern of said alignment mark is formed by disposing, between adjacent [blight] bright portions having a width of not less than a predetermined value, one or more [blight] bright patterns having a width of less than said predetermined value with a pitch less than said predetermined value.

7. (Amended) A mask according to claim 6, wherein the maximum value of said pitch is determined so that a concave and convex pattern formed by transferring said [blight] bright pattern on said mask onto a substrate is not more than resolution of an alignment sensor.

8. (Amended) A mask according to claim 7, wherein said [blight] bright pattern is regularly arranged.

9. (Amended) A mask according to claim 7, wherein said [blight] bright pattern is irregularly arranged.

11. (Amended) A mask according to claim 10, wherein the maximum value of said pitch is determined so that a concave and convex pattern formed by transferring said [blight] dark pattern on said mask onto a substrate is not more than resolution of an alignment sensor.

12. (Amended) A mask according to claim [7] 10, wherein said [blight] dark pattern is regularly arranged.

13. (Amended) A mask according to claim [7] 10, wherein said [blight] dark pattern is irregularly arranged.

24. (Amended) An exposure [method] apparatus comprising:
a projection optical system which projects an image of a mark on a mask onto a substrate to form an alignment mark on said substrate; and
an alignment sensor which detects said alignment mark formed on said substrate,
wherein said alignment mark includes a plurality of first patterns having a height and a second pattern for preventing a file covering the alignment mark from being depressed.